



Graphite Exploration in Arunachal Pradesh, India

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Abstract

In Arunachal Pradesh, India, the graphite occurrences have been reported from Bopi, Lamdak, Taliha, Tai, Hunli and Lalpani areas; however the exploration for graphite has been carried out in Tai-Tachidoni area of West Siang district. Graphite in this area is amorphous in nature, schistose and mixed with carbonaceous phyllite/schist. The schistose bands of graphite are 1-3cm thick within carbonaceous phyllite/schist. Flaky graphite is observed within quartz-mica schist/garnetiferous-quartz-mica schist. In Tai-Tachidoni area, three discontinuously exposed lenses of carbonaceous phyllite/schist hosted graphite schist were delineated over a cumulative strike extension of 5.5km with an average width of 30m. Analytical results have indicated 8.04 - 20.09% fixed carbon (FC) in bed rock samples. Scout drilling has been done in two boreholes to test the strike continuity and depth persistency of graphite schist, exposed on the surface. Six rich zones of graphite schist have been assayed over a thickness of 2.5-15.54m with grade varying from 10.25% FC to 14.5% FC, at vertical depth between 14-76m.

Keywords: Graphite, Khetabari Formation, Tai, West Siang district, Arunachal Pradesh, India